

1 **METHOD FOR PREDICTIVE POWER MANAGEMENT FOR OPERATING A DISK**
2 **DRIVE IN A MOBILE DEVICE TO OPTIMIZE POWER USAGE**

3 **ABSTRACT OF THE DISCLOSURE**

4 The invention may be embodied in a method for operating a disk drive in a mobile device
5 to optimize power usage. The mobile device may be a hand held computing device such as a
6 personal digital assistant (PDA) or a mobile terminal such as a cellular telephone. Immediately
7 after responding to a disk access command, the disk drive is in first operating mode that
8 consumes a relatively high level of power and may transition to a second operating mode that
9 consumes a relatively low level of power. A transition from the second operating mode to the
10 first operating mode consumes a transition quantity of power. A predictive technique tracks a
11 user's usage pattern and adapts an operating mode transition time based on the usage pattern.

Patent Drafting Services